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IFW

September 24, 2004

MS Amendment  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, Virginia 22313-1450

Re: U.S. Patent Application No.: 10/767,561  
For: *TUMOR CELLS MODIFIED TO EXPRESS B7-2 WITH INCREASED  
IMMUNOGENICITY AND USES THEREFORE*  
Inventors: Freeman, Gordon J., et al.  
Filed: January 28, 2004  
Our Ref. No.: RPI-008CPDV2

Dear Sir:

I enclose herewith for filing in the above-identified application the following:

1. Information Disclosure Statement;
2. PTO Form SB/08; and
3. A Return Postcard.

No additional costs are believed to be due in connection with the filing of this Information Disclosure Statement. However, please charge any necessary fees in connection with the enclosed statement to our Deposit Order Account No. 12-0080. For this purpose, a duplicate of this sheet is attached.

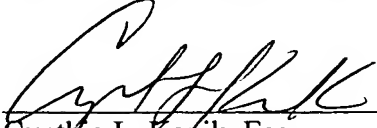
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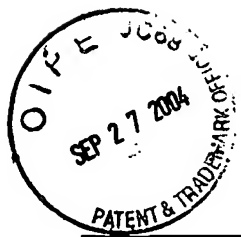
September 24, 2004

Date

Cynthia L. Kanik, Esq. Registration No. 37,320

Respectfully submitted,  
LAHIVE & COCKFIELD, LLP

  
Cynthia L. Kanik, Esq.  
Registration No. 37,320  
Attorney for Applicants



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re the application of: Freeman, Gordon J., *et al.*

Serial No.: 10/767,561

Filed: January 28, 2004

For: *TUMOR CELLS MODIFIED TO EXPRESS B7-2  
WITH INCREASED IMMUNOGENICITY AND USES  
THEREFORE*

Attorney Docket No.: RPI-008CPDV2

Group Art Unit: 1636

Examiner: Q. Nguyen

MS Amendment  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, Virginia 22313-1450

Certificate of First Class Mailing (37 CFR §1.8(a))

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September 24, 2004

Date of Signature and of Mail Deposit

By:

Cynthia L. Kanik, Esq.  
Registration No. 37,320  
Attorney for Applicants

INFORMATION DISCLOSURE STATEMENT


Dear Sir:

For the Examiner's convenience in reviewing this Divisional application, Applicants submit a consolidated PTO Form SB/08, listing all references cited during the prosecution of the parent application. The present application is a Divisional of U.S. Serial No. 09/206,132, filed December 7, 1998 (Atty. Docket No. RPI-008CPDV), now U.S. Patent No. 6,723,705B1. All references listed on the enclosed PTO Form SB/08 have been previously cited by or submitted to the Office in the prior application, and, in accordance with 37 CFR §1.98(d), copies of the references are not enclosed but will be provided upon request.

This statement is not to be interpreted as a representation that the cited publications are material, that an exhaustive search has been conducted, or that no other relevant information exists. Nor shall the citation of any publication herein be construed *per se* as a representation that such publication is prior art. Moreover, Applicants understand that the Examiner will make an independent evaluation of the cited publications.

Under 37 CFR § 1.97(b)(3), no additional costs are believed to be due in connection with the filing of this disclosure. If, however, a first Office Action on the merits issues in this application bearing a mailing date prior to the date of this Information Disclosure Statement, please charge the appropriate fee as required under 37 CFR §1.17(p) to our Deposit Order Account No. 12-0080.

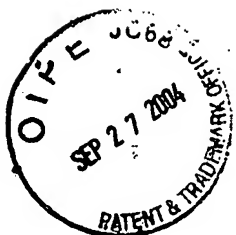
Respectfully submitted,  
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Enclosures



PTO/SB/08a/b (08-03)

Approved for use through 07/31/2006. OMB 0651-0031  
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<b>Substitute for form 1449A/B/PTO</b>  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  (Use as many sheets as necessary)				<b>Complete if Known</b>	
				Application Number	10/767,561
				Filing Date	January 28, 2004
				First Named Inventor	Freeman, Gordon J.
				Art Unit	1636
				Examiner Name	Q. Nguyen
Sheet	1	of	3	Attorney Docket Number	RPI-008CPDV2

U.S. PATENT DOCUMENTS					
Examiner Initials*	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code <sup>2</sup> (if known)			
	A1	5,116,964	05-26-92	Capon, <i>et al.</i>	
	A2	5,434,131	07-18-95	Linsley, <i>et al.</i>	

FOREIGN PATENT DOCUMENTS						
Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document	Publication Date	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T <sup>6</sup>
		Country Code <sup>3</sup> -Number <sup>4</sup> -Kind Code <sup>5</sup> (if known)	MM-DD-YYYY			
	A3	WO 93/00431	01-07-1993	Bristol Myers Squibb Co.		
	A4	WO 95/03408	02-02-1995	Dana Farber Cancer Institute		

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NON PATENT LITERATURE DOCUMENTS					
Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.			T <sup>2</sup>
	A5	Baskar, S. et al. (1993) "Constitutive Expression of B7 Restores Immunogenicity of Tumor Cells Expressing Truncated Major Histocompatibility Complex Class II Molecules" <i>Proc. Natl. Acad. Sci. USA</i> 90:5687-5690;			
	A6	Baskar, S., et al., "Major Histocompatibility Complex Class II <sup>+</sup> B7-1 <sup>+</sup> Tumor Cells are Potent Vaccines for Stimulating Tumor Rejection in Tumor-bearing Mice," <i>J. Exp. Med.</i> , vol. 181, 619-629 (1995);			
	A7	Bateman, W.J. et al. (1991) "Inducibility of Class II Major Histocompatibility Complex Antigens by Interferon $\gamma$ Is Associated with Reduced Tumorigenicity in C3H Mouse Fibroblasts Transformed by v-Ki-ras" <i>J. Exp. Med.</i> 173:193-196;			
	A8	Boussiotis, V., et al., "Activated Human B Lymphocytes Express Three CTLA-4 Counterreceptors That Costimulate T-cell Activation," <i>Proc. Natl. Acad. Sci. USA</i> , vol. 90, 11059-11063 (1993);			
	A9	Cavallo, F., et al., "Co-expression of B7-1 and ICAM-1 on Tumors is Required for Rejection and the Establishment of a Memory Response," <i>Eur. J. Immunol.</i> vol. 25, 1154-1162 (1995);			
	A10	Chen, L. et al. (1992) "Costimulation of Antitumor Immunity by the B7 Counterreceptor For the T Lymphocyte Molecules CD28 and CTLA-4" <i>Cell</i> 71:1093-1102;			
	A11	Clements, V.K. et al. (1992) "Invariant Chain Alters The Malignant Phenotype of MHC Class II <sup>+</sup> Tumor Cells" <i>J. of Immunology</i> 149:2391-2396;			
	A12	Cole, G.A. et al. (1991) "Rejection of Allogeneic Tumor Is Not Determined by Host Responses to MHC Class I Molecules and is Mediated By CD4 <sup>+</sup> CD8 <sup>+</sup> T Lymphocytes That Are Not Lytic for the Tumor" <i>Cellular Immunology</i> 134:480-490;			
	A13	Fearon, E.R. et al. (1990) "Interleukin-2 Production By Tumor Cells Bypasses T Helper Function in the Generation of An Antitumor Response" <i>Cell</i> 60:397-403;			
Examiner Signature		Date Considered			



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<b>Substitute for form 1449A/B/PTO</b>  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  (Use as many sheets as necessary)				<b>Complete if Known</b>	
				Application Number	10/767,561
				Filing Date	January 28, 2004
				First Named Inventor	Freeman, Gordon J.
				Art Unit	1636
				Examiner Name	Q. Nguyen
Sheet	2	of	3	Attorney Docket Number	RPI-008CPDV2

B1	Freeman, G.J. et al. (1991) "Structure, Expression, and T Cell Costimulatory Activity of the Murine Homologue of the Human B Lymphocyte Activation Antigen B7" <i>J. Exp. Med.</i> 174:625-631;
B2	Freeman, G., et al., "Cloning of B7-2: A CTLA-4 Counter-Receptor that Costimulates Human T Cell Proliferation," <i>Science</i> , vol. 262, 909-911 (1993);
B3	Freeman, A.S. et al. (1987) "B7, A B Cell-Restricted Antigen That Identifies Preactivated B Cells" <i>J. Immunology</i> 139:3260-3267;
B4	Freeman, G.J. (1989) "B7, A New Member of the Ig Superfamily With Unique Expression on Activated And Neoplastic B Cells" <i>J. Immunology</i> 143:2714-2722;
B5	Galvin, F. et al. (1992) "Murine B7 Antigen Provides A Sufficient Costimulatory Signal For Antigen-Specific and MHC-Restricted T Cell Activation" <i>J. Immunology</i> 149:3802-3808;
B6	Gimmi, C.D. et al. (1993) "Human T-Cell Clonal Anergy is Induced by Antigen Presentation in the Absence of B7 Costimulation" <i>Proc. Natl. Acad. Sci. USA</i> 90:6586-6590;
B7	Gimmi, C.D. et al. (1991) "B-Cell Surface Antigen B7 Provides A Costimulatory Signal That Induces T Cells To Proliferate and Secrete Interleukin 2" <i>Proc. Natl. Acad. Sci. USA</i> 88:6575-6579;
B8	Harding, F.A. et al. (1993) "CD28-B7 Interactions Allow the Induction of CD8 <sup>+</sup> Cytotoxic T Lymphocytes in the Absence of Exogenous Help" <i>J. Exp. Med.</i> 177:1791-1796;
B9	Harding, F.A. et al. (1992) "CD28-Mediated Signalling Co-Stimulates Murine T Cells and Prevents Induction of Anergy in T-Cell Clones" <i>Nature</i> 356:607-609;
B10	James, R.F.L. (1991) "The Effect of Class II Gene Transfection on the Tumourigenicity of the H-2K-Negative Mouse Leukaemia Cell Line K36.16" <i>Immunology</i> 172:213-218;
B11	Lenschow, D., et al., "Expression and Functional Significance of an Additional Ligand for CTLA-4," <i>Proc. Natl. Acad. Sci. USA</i> , vol. 90, 11054-11058 (1993);
B12	Linsley, P.S. et al. (1991) "Binding of the B Cell Activation Antigen B7 to CD28 Costimulates T Cell Proliferation and Interleukin 2 mRNA Accumulation" <i>J. Exp. Med.</i> 173:721-730;
B13	Nabavi, N. et al. (1992) "Signalling Through the MHC Class II Cytoplasmic Domain is Required For Antigen Presentation and Induces B7 Expression" <i>Nature</i> 360:266-268;
B14	Ostrand-Rosenberg, S. et al (1993) "Costimulation Through Murine B7 Molecule Restores Immunogenicity of Autologous Tumor Cells Expressing Truncated MHC Class II Molecules" <i>J. Cell Biochem Supplement</i> (Abstract HZ 228) p. 71;
B15	Ostrand-Rosenberg, S. et al. (1990) "Rejection Of Mouse Sarcoma Cells After Transfection of MHC Class II Genes" <i>J. Immunology</i> 144:4068-4071;
B16	Ostrand-Rosenberg, S. et al. (1991) "Abrogation of Tumorigenicity By MHC Class II Antigen Expression Requires The Cytoplasmic Domain of the Class II Molecule" <i>J. Immunology</i> 147:2419-2422;
B17	Ramarathinam, L., et al., "T Cell Costimulation by B7/BB1 Induces CD8 T Cell-dependent Tumor Rejection: An Important Role of B7/BB1 in the Induction, Recruitment, and Effector Function of Antitumor T Cells," <i>J. Exp. Med.</i> , vol. 179, 1205-1214 (1994);
B18	Reiser, H. et al. (1992) "Murine B7 Antigen Provides an Efficient Costimulatory Signal For Activation of Murine T Lymphocytes Via the T-Cell Receptor/CD3 Complex" <i>Proc. Natl. Acad. Sci. USA</i> 89:271-275;
B19	Shahinian, A., et al., "Differential T Cell Costimulatory Requirements in CD28-Deficient Mice," <i>Science</i> , vol. 261 609-612 (1993);
B20	Schultz, K.R. et al. (1990) "The Role of B Cells for In Vivo T Cell Responses to A Friend Virus-Induced Leukemia" <i>Science</i> 249:921-923.
B21	Schwartz, R., "A Cell Culture Model for T Lymphocyte Clonal Anergy," <i>Science</i> , vol. 248, 1349-1356 (1990);

Examiner Signature		Date Considered	
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Sheet	3	of	3	Attorney Docket Number	RPI-008CPDV2

C1	Tan, P. et al. (1993) "Induction of Alloantigen-Specific Hyporesponsiveness in Human T Lymphocytes by Blocking Interaction of CD28 with Its Natural Ligand B7/BB1" <i>J. Exp. Med.</i> 177:165-173;	
C2	Thompson, C.B. et al. (1989) "CD28 Activation Pathway Regulates the Production of Multiple T-Cell-Derived Lymphokines/Cytokines" <i>Proc. Natl. Acad. Sci USA</i> 86:1333-1337;	
C3	Townsend, S.E. et al. (1993) "Expression of the T Cell Costimulatory Ligand B7 By A Melanoma Induces Rejection Mediated By Direct Activation of CD8+ T Cells" <i>J. Cell Biochem. Supplement</i> (Abstract NZ 627) p. 136;	
C4	Townsend, S. and Allison, J., "Tumor Rejection After Direct Costimulation of CD8 <sup>+</sup> T Cells by B7-Transfected Melanoma Cells," <i>Science</i> , vol. 259, 368-370 (1993);	
C5	Townsend, S., et al., "Specificity and Longevity of Antitumor Immune Responses Induced by B7-transfected Tumors," <i>Cancer Research</i> , vol. 54, 6477-6483 (1994);	
C6	Travis, J. (1993) "A Stimulating New Approach to Cancer Treatment" <i>Science</i> 259:310-311;	
C7	van Der Bruggen, P. et al. (1991) "A Gene Encoding An Antigen Recognized By Cytolytic T Lymphocytes On A Human Melanoma" <i>Science</i> 254:1643-1647;	
C8	Yang, G., et al., "Antitumor Immunity Elicited by Tumor Cells Transfected with B7-2, a Second Ligand for CD28/CTLA-4 Costimulatory Molecules," <i>The Journal of Immunology</i> , 2794-2800 (1995).	

\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

<sup>1</sup>Applicant's unique citation designation number (optional). <sup>2</sup>Applicant is to place a check mark here if English language Translation is attached.

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